

Claims

1. (Currently Amended) A method for assembling first and second composite components, the method comprising:
 - (a) providing a woven preform having a base and a pair of spaced-apart legs extending from the base;
 - (b) infusing the preform with resin, and adhering the base of the preform to the first component; ~~then~~
 - (c) inserting a sizing tool between the legs and curing the resin while the tool is located between the legs to define a slot; ~~then~~ and
 - (d) removing the tool and applying an adhesive into the slot; then
 - (e) inserting the second component into the slot, the adhesive in the slot adhering at least one surface of the second component to at least one inner surface of the slot for retaining the second component within the slot, the second component having a smaller width than the tool.
2. (Original) The method of claim 1, wherein:
step (b) further comprises locating a film adhesive between the base of the preform and the first component.
3. (Original) The method of claim 1, wherein:
step (c) further comprises locating a peel ply within the slot, the peel ply separating the tool and the preform and being removable from the slot after the tool is removed.
4. (Original) The method of claim 1, further comprising:

coating the tool with a non-stick material to prevent adhesion of the tool to the legs and to reduce the force needed to remove the tool after curing of the preform.

5. (Previously Presented) The method of claim 1, wherein:

step (c) further comprises placing semi-rigid over-presses against outer surfaces of the base and the legs of the preform and placing the first component, the preform, the over-presses and the tool within a vacuum bag while curing the preform, each of the over-presses being generally triangular in cross-section for distributing a force across the preform.
6. (Previously Presented) The method of claim 1, further comprising:

adhering an over-wrap ply to the preform.
7. (Original) The method of claim 1, wherein:

steps (c) further comprises forming the legs to be perpendicular to the base.
8. (Original) The method of claim 1, wherein:

steps (c) further comprises forming the legs to be parallel to each other.
9. (Currently Amended) The method of claim 1, wherein:

step (c) further comprises vacuum bagging the first component and preform to ensure proper sizing and bonding.

10. (Canceled)
11. (Original) The method of claim 1, wherein:
step (d) further comprises coating inside surfaces of the legs with the adhesive.
12. (Previously Presented) A method for assembling first and second composite components, the method comprising:
- (a) providing a three-dimensional, woven preform having a base and a pair of spaced-apart, generally-parallel legs extending from the base; then
 - (b) infusing the preform with resin, and adhering at least one surface of the preform to at least one surface of the first component using a film adhesive; then
 - (c) inserting a sizing tool between the legs and curing the resin and film adhesive while the tool is located between the legs to define a slot and bond the preform to the first component; then
 - (d) removing the tool and applying a paste adhesive into the slot, the paste adhesive coating inside surfaces of the legs; and
 - (e) inserting the second component into the slot, the paste adhesive adhering at least one surface of the second component to at least one inner surface of the slot for retaining the second component within the slot, the second component having a smaller width than the tool.
13. (Original) The method of claim 12, further comprising:

step (c) comprises locating a peel ply within the slot, the peel ply being between the tool and the preform and being removable from the slot after the tool is removed.

14. (Previously Presented) The method of claim 12, further comprising:
coating the tool with a non-stick material to reduce the force needed to remove the tool after curing of the preform.
15. (Previously Presented) The method of claim 12, wherein:
step (c) further comprises placing semi-rigid over-presses against outer surfaces of the base and the legs of the preform and placing the preform, the first component, the tool and the over-presses within a vacuum bag while curing the preform, the over-presses being generally triangular in cross-section for distributing a force across the preform.
16. (Original) The method of claim 12, further comprising:
adhering an over-wrap ply to the preform and to the adhesive film.
17. (Previously Presented) The method of claim 12, wherein:
step (c) further comprises vacuum bagging the first component and preform to ensure proper sizing and bonding.
18. (Previously Presented) A method for assembling first and second composite components, the method comprising:

- (a) providing a three-dimensional, woven preform having a base and a pair of spaced-apart parallel legs extending from the base;
- (b) infusing the preform with resin, and adhering the base of the preform to at least one surface of the first component using a film adhesive, the first component being a composite member that is pre-cured; then
- (c) inserting a peel ply between the legs and inserting a tool within the peel ply between the legs; then
- (d) placing semi-rigid over-presses against outer surfaces of the base and the legs of the preform and placing the first component, the preform, the over-presses and the tool within a vacuum bag and curing the resin and film adhesive while the tool is located between the legs to define a clevis and bond the preform to the first component, the legs being perpendicular to the base; then
- (e) removing the tool, removing the peel ply, and applying a paste adhesive into the clevis; and
- (f) inserting the second component into the clevis, the second component being a composite member that is pre-cured, the paste adhesive adhering at least one surface of the second component to at least one inner surface of the clevis for retaining the second component within the clevis, the second component having a smaller width than the tool.